

**What is claimed is:**

1. A method performed with an enterprise storage system comprising disk storage and sequential storage media, the method serving data storage needs of a given client coupled to the enterprise storage system via a network, the method comprising:

performing a physical device level backup of data from the disk storage to the sequential storage media, while minimizing demands on the client, the device level backup comprising a complete image backup of data in a host device as defined from a perspective of the given client; and

performing a logical restore of data on a file by file basis from physically backed data on the sequential storage media, the logical restore involving locating files requested by the client on the sequential storage media and recovering the files from the sequential storage media, the files comprising files defined in accordance with a files system defined by the client.

2. The method according to claim 1, further comprising:

a user requests, through the client a disaster recovery; and

the client specifying all files of the file system to cause the act of performing a logical restore to restore all files of the file system.

3. The method according to claim 1, wherein the physical device backup comprises:

a data manager obtaining a host device map from the client;

the data manager obtaining a file system map from the client;

the data manager copying raw data of the host device on the disk storage to the sequential storage and creating a restore mapping, the restore mapping identifying sequential bit position information of the sequential storage media and tracking correspondence among such bit positions to given files and bit positions within the given files; and

persisting the host device map and the file system map on disk media.

4. The method according to claim 3, wherein the logical restore comprises:

receiving a request for a restore of given files;

creating a tape selection map, with blocks to be restored ordered so as to correspond to tape positions monotonically ascending;

obtaining from the client destination information including target block locations for all blocks of the files being restored;

prepare a refreshed file system map describing preallocated target locations to be reserved on the disk storage;

correlate source block information with target block information and create an instructive consolidated list including (i) block skip information directing that certain numbers of blocks be skipped over and not restored at certain points in the restore pass on the sequential storage media and including (ii) a destination block for blocks preceeding and succeeding the blocks to be skipped; and

making a single pass on the sequential storage media, restoring all requested data files.